ORDINANCE 24-14

AN ORDINANCE OF THE CITY OF WHITE HOUSE, TENNESSEE AMENDING THE MUNICIPAL CODE TITLE 16, CHAPTER 2 <u>STREET, SIDEWALK AND DRAINAGE DESIGN STANDARDS</u>, SECTION 16-234.

WHEREAS, the Board of Mayor and Aldermen desire to update the Municipal Code regarding Street, Sidewalk and Drainage Standards;

NOW, THEREFORE, BE IT ORDAINED by the Board of Mayor and Aldermen that the White House Municipal Code Title 16, Chapter 2 <u>STREET, SIDEWALK AND DRAINAGE DESIGN STANDARDS</u>, Sections 16-234 be amended from the Municipal Code as follows:

 TITLE 16:
 STREETS AND SIDEWALKS, ETC.

 CHAPTER 2:
 STREET, SIDEWALK AND DRAINAGE DESIGN STANDARDS

 SECTIONS:
 16-234

 *Amends are made in bold, italics, and underlined text.

16-234. Pipe, culverts, and storm sewers. Pipe used for cross drains under the street and within the city's R-O-W may be HDPE or Polypropylene Pipe and must meet AASHTO Standards or <u>shall be</u> Reinforced Concrete Pipe (RCP). Side drains under driveways, or within the interior of the development, may be RCP or HDPE ADS plastic pipe <u>and must meet AASHTO Standards</u>. Driveway culverts and interior development piping shall be the responsibility of the property owner or the HOA.

(1) <u>Concrete pipe</u>. Concrete pipe shall be reinforced Class III rigid pipe and shall be round, oval or flat based as shown on the approved plans or special provisions, so long as these meet or exceed specification of this section. All precast concrete pipe shall be manufactured in accordance with the "TDOT Procedures for Manufacture and Acceptance of Precast Drainage Structures, Noise Wall Panels and Retaining Walls."

(2) Plastic and polyethylene corrugated pipe. This pipe shall be dual wall HDPE, or, HP storm highperformance Polypropylene Pipe (PP) corrugated outside with smooth finish inside wall. (Referenced in TDOT Spec 914.10 and 914.12): High Density Polyethylene (HDPE) pipe shall conform to AASHTO M294, Type S [Type S is smooth-walled interior, corrugated exterior] and Polypropylene (PP) pipe shall conform to AASHTO M330. Installation (Referenced in TDOT Spec 607); Joint Performance: (TDOT Spec 607.07): HDPE, PP pipe shall be joined in accordance with ASTM D3212 and meet performance requirements for water-tight joints; Fill heights (Table 6A-1): HDPE, PP pipe shall be utilized in applications that are in accordance with TDOT Table 6A-1 (all roadways with up to sixteen feet (16') of fill height - with the exception of interstate systems and any arterial with full access control); Bedding and Backfill (referenced in TDOT Spec 204.04, 204.11.B): Bedding for pipe culverts shall conform to the requirements of Class A, B, or C bedding, whichever is shown on the plans or in the special provisions; Trench detail (reference in standard detail D-PB-2/Flexible pipe): Specifies Class "B" bedding material, six inch (6") structural backfill over the crown of the flexible pipe, as well as a trench width eighteen inches (18") on either side of the pipe OD. This pipe may be used for site drainage and may be used under streets at the discretion of the public services director or his/her designee. Plastic pipe may exit from the back side of a street drainage structure and extend off the city R-O-W. The development HOA shall be responsible for the maintenance of the HDPE or PP plastic pipe outside of the R-O-W. Plastic and polyethylene corrugated pipe shall meet TDOT specifications for pipe material, bedding material, installation, and backfill.

(3) <u>Pipe materials and requirements</u>. All *outfall structures and* storm sewer drainage pipes located within the roadway right-of-way shall be reinforced concrete pipe (RCP). The minimum size diameter for storm water culvert, is fifteen inches (15"). The minimum slope shall be one-half percent (0.5%) or that necessary to create a full-flow velocity of two feet per second (2 fps).

(4) <u>Pipe bedding</u>. Pipe bedding for concrete pipe shall be #57 or #67 stone, requiring a minimum of six inches (6") inches of stone below the pipe and shaped by a template to fit the lower part of the pipe exterior for at least ten percent (10%) of its overall height. The depth of bedding material is predicated on soil conditions. <u>Pervious materials</u> such as sand, gravel, or stone shall not be used as bedding or backfill around outfall structures or anti-seep collars.

Fill material shall be placed around the pipe in 4- inch layers and compacted until 95% compaction of the standard proctor is achieved by with the use of mechanical compaction equipment (compact by hand with plate compactor, if necessary). A minimum of two feet of fill shall be hand-compacted around and over the barrel before crossing it with construction equipment. Soil should be hand-tamped around the pipe barrel, especially below the haunches, to achieve good compaction around the pipe and to prevent damage to the joints and anti-seep collars.

This ordinance shall become effective upon its final reading and adoption by the Board of Mayor and Aldermen, and publication, the public welfare requiring it.

First Reading: August 15, 2024 PASSED

Second Reading: September 19, 2024 PASSED

John Corbitt, Mayor

ATTEST:

Derek Watson, City Recorder